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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/646,901	08/22/2003	Aaron James Gannon	H0003570--1623	1338
128	7590	02/23/2005	EXAMINER	
HONEYWELL INTERNATIONAL INC. 101 COLUMBIA ROAD P O BOX 2245 MORRISTOWN, NJ 07962-2245			BETZ, BLAKE E	
			ART UNIT	PAPER NUMBER
			2672	

DATE MAILED: 02/23/2005

Please find below and/or attached an Office communication concerning this application or proceeding.

Office Action Summary

Application No.

10/646,901

Applicant(s)

GANNON, AARON JAMES

Examiner

Blake E. Betz

Art Unit

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-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☐ Responsive to communication(s) filed on ____.
- 2a) ☐ This action is FINAL. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1-40 is/are pending in the application.
- 4a) Of the above claim(s) ____ is/are withdrawn from consideration.
- 5) ☐ Claim(s) ____ is/are allowed.
- 6) ☒ Claim(s) 1-4, 9-19, 21-24 and 29-39 is/are rejected.
- 7) ☒ Claim(s) 5-8, 20, 25-28, and 40 is/are objected to.
- 8) ☐ Claim(s) ____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on ____ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some * c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
2. ☐ Certified copies of the priority documents have been received in Application No. ____.
3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- 1) ☒ Notice of References Cited (PTO-892)
- 2) ☐ Notice of Draftperson's Patent Drawing Review (PTO-948)
- 3) ☐ Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08)
Paper No(s)/Mail Date ____.
- 4) ☐ Interview Summary (PTO-413)
Paper No(s)/Mail Date. ____.
- 5) ☐ Notice of Informal Patent Application (PTO-152)
- 6) ☐ Other: ____.

DETAILED ACTION

Claim Objections

Claim 5 is objected to because of the following informalities: edge point image point should be changed to edge point as in claim 25. Appropriate correction is required.

Claim Rejections - 35 USC § 103

The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

Claims 1 – 4, 9, 11 – 19, 21 – 24, 29, and 31 – 39 are rejected under 35 U.S.C. 103(a) as being unpatentable over U.S. Patent No. 6,396,507 to Kaizuka et al.

Claims 1 and 21 are disclosed by the invention of Kaizuka et al. Kaizuka et al. teaches of a system and method for the zooming of an image in a data storage/access network system. As shown in Figures 3A – 3E and 8A – 8D, the invention of Kaizuka changes the relative size of the image when a zoom function is performed on a designated region. Column 17, lines 60 – 67, states, "According to the image zooming apparatus of this embodiment, while zooming processing is being performed in accordance with a zoom-in instruction on the image shown in, e.g., FIG. 8A, the process of gradually zooming the image to the final zoomed image is displayed, as shown in FIGS. 8B and 8C, although, in the prior art, the display screen is not changed for a long time and suddenly switched to the image at the final zoom ratio shown in FIG. 8D."

zooming is instructed on the image, the zooming target portion can be visually confirmed, and the user can clearly grasp the zooming target portion. In addition, in this embodiment, the user does not become tired with the processing because he/she can see the process of gradually zooming the image. For this reason, the stress of the user during the zooming processing can also be reduced.” Thus, the zoomed portion of the image gradually translates from its original position to the central point in the display along a substantially straight line. Kaizuka et al. does not teach, however, of a substantially straight zoom line that passes through the selected zoom point and extends between a central point in the display area and an edge point on the display area that is closes to the selected zoom point. It is well known in the art that the shortest distance between two points is a straight line. While translating the zoomed portion of the image from its original position to the central position, it would have been obvious to one having ordinary skill in the art at the time the invention was made to modify the invention of Kaizuka such that the zoomed area follows a substantially straight line that extends from the central position, through the zoomed area, to a point on the edge of the image. One would have been motivated to make such a modification to the invention of Kaizuka so that a user can clearly grasp the zooming target portion while the area is being zoomed as stated in column 14, lines 55 – 59. Additionally, by translating the zoomed portion along a straight line to the center point allows a user to visually conceive where the zoomed portion was originally located in relation to the original image.

Kaizuka et al. teaches of the invention of claims 2 and 22. Column 14, lines 1 – 3, states, “Thereafter, an image enlarged by a final zoom ratio and having a lower resolution than that of the image shown in FIG. 3C is displayed in the entire display frame 31, as shown in FIG. 3D.” Lines 26 – 31 state, “In step S3, it is determined whether the image (zooming target) in the rectangular region 32 designated in step S1 is enlarged to the entire display frame 31. If NO in step S3, the flow advances to step S4 to increase the interpolation ratio and then returns to step S2 to perform the same processing as described above.” Thus, Kaizuka teaches of inhibiting any further change in relative size once a final zoom ratio has been achieved. Additionally, Kaizuka determines if the zoomed image is enlarged to the entire display frame such that the image reaches the central point in the display area and if so then stops processing the image.

Kaizuka does not teach of translating the selected zoom portion when the zoom area substantially coincides with the display area central point. Therefore, Kaizuka discloses the invention as specified in the negatively limiting claims of claims 3 and 23.

Kaizuka et al. teaches of the invention of claims 4 and 24 except while changing the relative size of the selected zoom point, at least a portion of the displayed image is translated out of the display area. From looking at figures 3A – 3E, it would have been obvious to one having ordinary skill in art at the time the invention was made to modify the invention of Kaizuka to allow a further zoom in function to be performed on the previous selected zoom point to change the selected size of the zoom point, thus allowing a greater zooming in capability. Additionally, while zooming in further, it is

obvious that a portion of the display area that is not part of the selected zoom area will be translated out of the displayed frame. One would have been motivated to make such a modification to the invention of Kaizuka so that a user may be able to further zoom in on an area of interest in order to view that section in greater detail.

Kaizuka et al. teaches of the invention of claims 9 and 29. Figures 3A – 3E and 8A – 8D show a rectangular border surrounding the selected zoom portion such that the border is translated substantially coincident with the translation of the selected zoom area.

Kaizuka et al. teaches of the invention of claims 11 and 31. Column 14, lines 65 – 67, and column 15, lines 1 – 2, describe a data storage section to store image data for zoom processing. “More specifically, until image data in the designated wide range is read out on the server and transferred to the client, stepwise zoom-out processing is performed using image data stored in the data storage section 18 of the client.”

Kaizuka et al. teaches of the invention of claims 12 and 32. Column 14, lines 62 – 65, states, “When an image currently displayed on the image display section 17 on the client side is to be zoomed out to display a wider range, the above-described zooming processing can be applied.” Thus, Kaizuka teaches of performing a zoom-out function in a manner opposite to that which the zoom area was originally changed.

Kaizuka et al. teaches of the invention of claims 13 and 33. As shown in figures 3A – 3E and 8A – 8D, each image point from an original position in the selected zoom portion is translated to a final position when changing the relative size of the selected zoom area.

Kaizuka et al. teaches of the invention of claims 14 and 34. Column 14, lines 65 – 67, and column 15, lines 1 – 2, describe a data storage section to store image data for zoom processing. “More specifically, until image data in the designated wide range is read out on the server and transferred to the client, stepwise zoom-out processing is performed using image data stored in the data storage section 18 of the client.”

Kaizuka et al. teaches of the invention of claims 15 and 35. Column 14, lines 62 – 65, states, “When an image currently displayed on the image display section 17 on the client side is to be zoomed out to display a wider range, the above-described zooming processing can be applied.” Thus, Kaizuka teaches of performing a zoom-out function in a manner opposite to that which the zoom area was originally changed. By performing the process of figures 3A – 3E and 8A – 8D in a manner opposite to that which the zoom area was originally changed, it can be seen that each image point in the selected zoom area is translated along a substantially straight line from its final position to its stored original position when changing the relative size of the selected zoom point.

Kaizuka et al. teaches of the invention of claims 16 and 36. Figure 19A shows an image with a plurality of arrows positioned next to the image for scrolling purposes. When scrolling an image, the positions of the image points in the image will be changed to updated positions. Thus, the final and original as well as each of the image points will be changed to an updated position. Column 14, lines 65 – 67, and column 15, lines 1 – 2, describe a data storage section to store image data for zoom processing. “More specifically, until image data in the designated wide range is read out on the server and transferred to the client, stepwise zoom-out processing is performed using image data

stored in the data storage section 18 of the client.” Additionally, Column 14, lines 62 – 65, states, “When an image currently displayed on the image display section 17 on the client side is to be zoomed out to display a wider range, the above-described zooming processing can be applied.” Thus, Kaizuka teaches of performing a zoom-out function in a manner opposite to that which the zoom area was originally changed. By performing the process of figures 3A – 3E and 8A – 8D in a manner opposite to that which the zoom area was originally changed with the updated scrolled image, it can be seen that each image point in the selected zoom area is translated along a substantially straight line from its changed final position to its changed original position when changing the relative size of the selected zoom point.

Kaizuka et al. teaches of the invention of claims 17 – 19 and 37 – 39. Kaizuka teaches of both a zoom-in and a zoom-out process whereby the two are performed in a manner opposite to each other. Thus, after performing a zoom-in and zoom-out process on an image, the original image is available to the user once again. Upon selecting a new zoom portion after having already changed the image by zooming in and out, the new zoom portion original position is its position before the relative size of the previously selected zoom point was changed. Additionally, as seen in figures 3A – 3E and 8A – 8D, the zoom portion is translated along an original zoom line that is a substantially straight line that passes through the new zoom point original position and extends between the display area central point and a display area edge point that is closes to the new zoom point. By translating the new zoom portion to the center of the frame, the relative size of the new zoom area is changed and occupies a position it

would have occupied had the new zoom area been the previously selected zoom area. Thus, the new zoom area is moved from its present location as shown in figures 3A and 8A to a new position on the new zoom area original zoom line as shown in figures 3E and 8D.

Claims 10 and 30 are rejected under 35 U.S.C. 103(a) as being unpatentable over U.S. Patent No. 6,396,507 to Kaizuka et al. as applied to claims 9 and 29 above, respectively, and further in view of U.S. Patent No. 5,583,984 to Conrad et al.

Kaizuka et al. teaches of the invention of claims 10 and 30 except removing the zoom symbol from the display area when the cursor symbol is moved. Column 17, lines 11 – 16, describe displaying a cursor symbol in the display area. “On the displayed image shown in FIG. 8A, a mouse cursor 33 is moved to the central point or an arbitrary point of a rectangular region (the region has similar shape to the display frame 31, and the similitude ratio is determined in advance) as a zooming target, and the region to be enlarged is designated by clicking the mouse.” Conrad et al. teaches of a graphical user interface that opens and closes enclosures when an object is dragged over a location on top of an icon or text representing a closed enclosure. Column 11, lines 17 – 27, describes removing a select icon when the cursor is moved through a designated area. “In FIGS. 15A and 15B, another alternative sequence is shown. In this sequence, a dragged icon 1501 is dragged over a folder. When this occurs, a select icon appears, such as an opened folder icon 1502 with a split pie symbol. The split pie has a first side 1503 and a second side 1504. If the user moves the cursor downward to the second side 1504, as illustrated in FIG. 15B, then the sprung open enclosure is opened.

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Alternatively, if the user moves the cursor upward into the first side 1503, then some other action may occur. If user moves the cursor through the split pie, then the select icon is removed and the original icon reappears.” Thus, Conrad teaches of removing the select symbol when the cursor is moved from a certain location. It would have been obvious to one having ordinary skill in the art at the time the invention was made to modify the invention of Kaizuka to include removing the zoom symbol from the display area when the cursor symbol is moved. One would have been motivated to make such a modification to Kaizuka so that when a zooming function is not being performed on the selected portion of an image, the zoom symbol is quickly removed when a user moves the cursor symbol out of the zoom region, thus preventing any blocking of the image by the zoom symbol.

Allowable Subject Matter

Claims 5, 6, 7, 8, 20, 25, 26, 27, 28, and 40 are objected to as being dependent upon a rejected base claim, but would be allowable if rewritten in independent form including all of the limitations of the base claim and any intervening claims.

Referring to claims 5 and 25, none of the prior art teaches of maintaining the position of the image edge point while changing the relative size of the selected zoom point.

Referring to claims 6 and 26, none of the prior art teaches of maintaining the alignment of each of the image points with the display area edge that includes the display area edge point while changing the relative size of the selected zoom point.

Referring to claims 8 and 28, none of the prior art teaches of changing the relative size of the entire displayed image substantially simultaneously with the changing of the relative size of the selected zoom point.

Referring to claims 20 and 40, none of the prior art teaches of an average zoom line corresponding to an average of the new zoom point original zoom line and a new zoom point zoom line.

Conclusion

The prior art made of record and not relied upon is considered pertinent to applicant's disclosure.

U.S. Patent No. 5,523,769 to Lauer et al.

U.S. Patent No. 5,671,381 to Strasnick et al.

U.S. Patent No. 5,790,819 to Rosenberg et al.

U.S. Patent No. 6,320,599 to Sciammarella et al.

U.S. Patent No. 6,535,233 to Smith

U.S. Patent No. 6,621,501 to Morrison

U.S. Patent No. 6,633,305 to Sarfeld

U.S. Patent No. 6,847,382 to Chong et al.

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Blake E. Betz whose telephone number is (703) 605-4584. The examiner can normally be reached on 7:30 - 4:00 M-F.

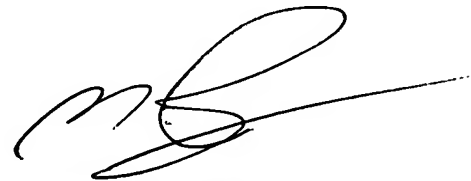
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If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Michael Razavi can be reached on (703) 305-4713. The fax phone number for the organization where this application or proceeding is assigned is 703-872-9306.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

BB

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